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SEARCH REQUEST FORM

Scientific and Technical Information Center

Requester's Full Name: San Ming R. Hsu Examiner #: 78222 Date: 4/22/03
Art Unit: 1617 Phone Number 30 5-1072 Serial Number: 09/992,510
Mail Box and Bldg/Room Location: [illegible] Results Format Preferred (circle): PAPER DISK E-MAIL
→ 2B19 → 3D09
If more than one search is submitted, please prioritize searches in order of need.

****

Please provide a detailed statement of the search topic, and describe as specifically as possible the subject matter to be searched. Include the elected species or structures, keywords, synonyms, acronyms, and registry numbers, and combine with the concept or utility of the invention. Define any terms that may have a special meaning. Give examples or relevant citations, authors, etc, if known. Please attach a copy of the cover sheet, pertinent claims, and abstract.

Title of Invention: Tricyclic RANTES receptor ligands

Inventors (please provide full names): Geeta Saxena, Christopher Tudan Ahmed Mergouk, Hassan Salari

Earliest Priority Filing Date: 06/14/2001

***For Sequence Searches Only* Please include all pertinent information (parent, child, divisional, or issued patent numbers) along with the appropriate serial number.**

please search claim 1, the disease is ~~autoimmune~~ disease such as rheumatoid arthritis, inflammation, multiple sclerosis.

The elected compound is compound of formula (X). If not found, please search other compounds too.

Thanks

San

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Searcher: Stephanie
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Searcher Location: _____
Date Searcher Picked Up: _____
Date Completed: 4/22/03
Searcher Prep & Review Time: _____
Clerical Prep Time: _____
Online Time: _____

Type of Search — Vendors and cost where applicable

NA Sequence (#)		STN	
AA Sequence (#)		Dialog	
Structure (#)		Questel/Orbit	
Bibliographic		Dr.Link	
Litigation		Lexis/Nexis	
Fulltext		Sequence Systems	
Patent Family		WWW/Internet	
Other		Other (specify)	

PTO-1590 (8-01)

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FILE COVERS 1907 - 22 Apr 2003  VOL 138 ISS 17
FILE LAST UPDATED: 21 Apr 2003  (20030421/ED)

 This file contains CAS Registry Numbers for easy and accurate
 substance identification.


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L7                STR
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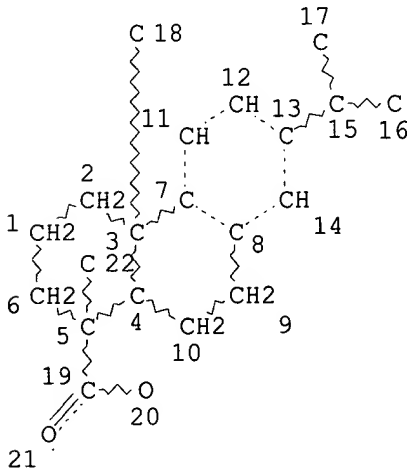


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NODE ATTRIBUTES:
DEFAULT MLEVEL IS ATOM
DEFAULT ECLEVEL IS LIMITED

GRAPH ATTRIBUTES:
RING(S) ARE ISOLATED OR EMBEDDED
NUMBER OF NODES IS  22

STEREO ATTRIBUTES: NONE
L9          214 SEA FILE=REGISTRY SSS FUL L7
L13           8 SEA FILE=HCAPLUS ABB=ON  PLU=ON  L9 AND (AUTOIMMUN? OR
                ?ARTHRIT? OR ?RHEMAT? OR ?INFLAM? OR ?SCLERO?)
L14           1 SEA FILE=HCAPLUS ABB=ON  PLU=ON  L9 AND CHEMOKIN?
L15           8 SEA FILE=HCAPLUS ABB=ON  PLU=ON  L13 OR L14
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=> d ibib abs hitrn l15 1-8

L15 ANSWER 1 OF 8 HCAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2002:977646 HCAPLUS
DOCUMENT NUMBER: 138:49921
TITLE: Tricyclic terpenes of the family of abietic acid as RANTES receptor ligands
INVENTOR(S): Saxena, Geeta; Tudan, Christopher R.; Merzouk, Ahmed; Salari, Hassan
PATENT ASSIGNEE(S): Chemokine Therapeutics Corporation, Can.
SOURCE: PCT Int. Appl., 69 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2002102365	A1	20021227	WO 2002-CA840	20020606

W: AE, AG, AL, AM, AT, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, CZ, DE, DE, DK, DK, DM, DZ, EC, EE, EE, ES, FI, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, OM, PH, PL, PT, RO, RU, SD, SE, SG, SI, SK, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZM, ZW, AM, AZ, BY, KG
RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG

PRIORITY APPLN. INFO.: US 2001-881559 A 20010614
US 2001-992550 A 20011113
OTHER SOURCE(S): MARPAT 138:49921
AB A method of treating a **chemokine**- or **chemokine** receptor-mediated disease using a tricyclic terpene compd. that binds to one or more RANTES receptors is described. For example, the ability of tricyclic terpenes to competitively inhibit binding of the **chemokine** ligand RANTES to its receptors (CCR-1, -3, -4, and -5) on THP-1 type cells was demonstrated. Thus neoabietic acid (CTCM 189), sandaraco-pimaric acid, and ammonium pimarate at 4 .mu.g/mL inhibited RANTES binding by 68%, 36%, and 48%, resp. Neoabietic acid showed an almost complete inhibition of RANTES-induced [Ca2+]i mobilization in THP-1 cells at the concn. of 5 .mu.M. In accordance with this aspect of the invention, the neoabietic acid or corresponding salts may be used for the treatment of a wide range of **inflammatory** diseases such as gout, **arthritis**, **osteoarthritis**, rheumatoid **arthritis**, reperfusion injuries, **inflammatory** bowel diseases, and ARDS.
IT **1740-19-8**
RL: PAC (Pharmacological activity); THU (Therapeutic use); BIOL (Biological study); USES (Uses)
(tricyclic terpenes based on abietic acid as **chemokine** receptor ligands for treatment of **chemokine**-mediated disease)
REFERENCE COUNT: 24 THERE ARE 24 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L15 ANSWER 2 OF 8 HCAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2002:252418 HCAPLUS
DOCUMENT NUMBER: 136:257244
TITLE: Naturally occurring compounds and their derivatives as

cyclooxygenase 2 and/or 5-lipoxygenase inhibitors
INVENTOR(S): Russell, Brett A.; Miller, John D.; Cashman, John R.; Weerawarna, Sirimevan A.
PATENT ASSIGNEE(S): C-P Technology Limited Partnership, USA
SOURCE: U.S., 38 pp.
CODEN: USXXAM
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
US 6365634	B1	20020402	US 1998-210343	19981211

PRIORITY APPLN. INFO.: US 1997-69557P P 19971212
US 1998-75152P P 19980219
US 1998-95597P P 19980805

AB This invention discloses methods for treating **inflammation** by inhibiting the prodn. of pro-**inflammatory** metabolites via the cyclooxygenase and/or lipoxygenase pathways, comprising administering 4-cumylphenol or salts or solvates thereof. Examples are provided on isolation and identification of natural **antiinflammatory** compds. from peat bog. Several compds., including dehydroabietic Me ester, 3-methoxyaniline, and 4-cumylphenol were thus identified and tested for activity against COX I, COX II, 5-LO and 15-LO enzymes and cytotoxicity.

IT **1235-74-1P**, Dehydroabietic acid methyl ester
RL: PAC (Pharmacological activity); PUR (Purification or recovery); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)
(isolation of compds. from peat bog with cyclooxygenase and/or lipoxygenase inhibitory activity)

IT **1740-19-8**, Dehydroabietic acid
RL: RCT (Reactant); RACT (Reactant or reagent)
(isolation of compds. from peat bog with cyclooxygenase and/or lipoxygenase inhibitory activity)

REFERENCE COUNT: 4 THERE ARE 4 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L15 ANSWER 3 OF 8 HCAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 2002:159030 HCAPLUS
DOCUMENT NUMBER: 136:318987
TITLE: Inhibition of Tumor-Promoting Effects by Poricoic Acids G and H and Other Lanostane-Type Triterpenes and Cytotoxic Activity of Poricoic Acids A and G from Poria cocos
AUTHOR(S): Ukiya, Motohiko; Akihisa, Toshihiro; Tokuda, Harukuni; Hirano, Masaya; Oshikubo, Manabu; Nobukuni, Yoshitoshi; Kimura, Yumiko; Tai, Takaaki; Kondo, Seizo; Nishino, Hoyoku
CORPORATE SOURCE: College of Science and Technology, Nihon University, Chiyoda-ku, Tokyo, 101-8308, Japan
SOURCE: Journal of Natural Products (2002), 65(4), 462-465
CODEN: JNPRDF; ISSN: 0163-3864
PUBLISHER: American Chemical Society
DOCUMENT TYPE: Journal
LANGUAGE: English

AB The structures of two novel 3,4-seco-lanostane-type triterpenes isolated from the **sclerotium** of Poria cocos were established to be 16.alpha.-hydroxy-3,4-seco-lanosta-4(28),8,24-triene-3,21-dioic acid (1; poricoic acid G) and 16.alpha.-hydroxy-3,4-seco-24-methyllanosta-4(28),8,24(241)-triene-3,21-dioic acid (2; poricoic acid H) on the basis of spectroscopic methods. These two, and eight other known compds. isolated from the **sclerotium**, poricoic acid B (3), poricoic acid

A (4), tumulosic acid (5), dehydrotumulosic acid (6), 3-epidehydrotumulosic acid (7), polyporenic acid C (8), 25-hydroxy-3-epidehydrotumulosic acid (9), and dehydroabietic acid Me ester (10), showed potent inhibitory effects on Epstein-Barr virus early antigen (EBV-EA) activation induced by the tumor promoter 12-O-tetradecanoylphorbol-13-acetate (TPA). Evaluation of the cytotoxicity of compds. 1 and 4 against human cancer cell lines revealed that 1 was significantly cytotoxic to leukemia HL-60 cells [GI50 (concn. that yields 50% growth) value 39.3 nM], although it showed only moderate cytotoxicity to the other cells. Compd. 4 exhibited moderate cytotoxicity to all of the cancer cell lines tested.

IT **1235-74-1**, Dehydroabietic acid methyl ester
RL: NPO (Natural product occurrence); PAC (Pharmacological activity); THU (Therapeutic use); BIOL (Biological study); OCCU (Occurrence); USES (Uses)
(inhibition of tumor-promoting effects by poricoic acids G and H and other lanostane-type triterpenes and cytotoxic activity of poricoic acids A and G from Poria cocos)

REFERENCE COUNT: 25 THERE ARE 25 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L15 ANSWER 4 OF 8 HCAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1999:442648 HCAPLUS
DOCUMENT NUMBER: 132:47500
TITLE: Diterpene constituents of Juniperus polycarpos and their antimicrobial and anti-**inflammatory** activities
AUTHOR(S): El-Sayed, Aly M.
CORPORATE SOURCE: Department of Pharmacognosy, Faculty of Pharmacy, Cairo University, Cairo, Egypt
SOURCE: Zagazig Journal of Pharmaceutical Sciences (1998), 7(1), 80-86
CODEN: ZJPSEV; ISSN: 1110-5089
PUBLISHER: University of Zagazig, Faculty of Pharmacy
DOCUMENT TYPE: Journal
LANGUAGE: English

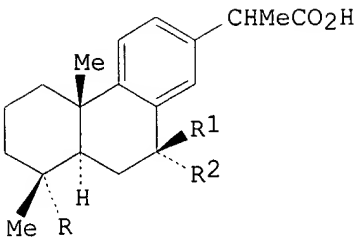
AB Activity-directed study of Juniperus polycarpos led to the isolation of active antimicrobial viz., hinokiol, sandaracopimaric acid, 4-epiabietic acid, and other minor terpenes in addn. to .omega.-lauryllactone. The **antiinflammatory** activity of hinokiol was also demonstrated using carrageenan-induced **inflammation** in rats. The structures of the isolated terpenes were detd. by 1HNMR, 13CNMR and 2DNMR, APT, DEPT, PND spectra.

IT **5155-70-4P**, 4-Epidehydroabietic acid
RL: BAC (Biological activity or effector, except adverse); BOC (Biological occurrence); BSU (Biological study, unclassified); PRP (Properties); PUR (Purification or recovery); BIOL (Biological study); OCCU (Occurrence); PREP (Preparation)
(isolation, anti-**inflammatory**, and antibacterial activity of diterpene constituents of Juniperus polycarpos)

REFERENCE COUNT: 24 THERE ARE 24 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L15 ANSWER 5 OF 8 HCAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1993:39189 HCAPLUS
DOCUMENT NUMBER: 118:39189
TITLE: Preparation of potential **antiinflammatory** agents from dehydroabietic acid
AUTHOR(S): Li, Wen Shyong; McChesney, James D.
CORPORATE SOURCE: Dep. Agric. Chem., Natl. Pingtung Inst. Agric., Taiwan
SOURCE: Journal of Pharmaceutical Sciences (1992), 81(7), 646-51
CODEN: JPMSAE; ISSN: 0022-3549
DOCUMENT TYPE: Journal

LANGUAGE: English
GI



I

AB Title compds. I (R = CO2H, CO2Me, R1 = H, OH, R2 = H, R1R2 = O; R = CH2OH, CH2OAc, R1, R2 = H) were prepd. from dehydroabietic acid isolated from resin. I were devoid of fungicidal and bactericidal activity. Only I (R = CO2Me, R1R2 = H2, O) had weak **antiinflammatory** activity.

IT **1740-19-8P**
RL: RCT (Reactant); PREP (Preparation); RACT (Reactant or reagent)
(isolation and esterification of)

IT **144969-76-6P**
RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)
(prepn. and **antiinflammatory** activity of)

IT **1235-74-1P 144969-67-5P**
RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)
(prepn. and oxidn. of)

IT **144969-68-6P**
RL: SPN (Synthetic preparation); PREP (Preparation)
(prepn. of)

IT **144969-71-1P**
RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)
(prepn., hydrolysis, and **antiinflammatory** activity of)

L15 ANSWER 6 OF 8 HCAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1992:658034 HCAPLUS
DOCUMENT NUMBER: 117:258034
TITLE: Studies with tissue cultures of the Chinese herbal plant Tripterygium wilfordii. Isolation of metabolites of interest in rheumatoid **arthritis**, immunosuppression, and male contraceptive activity
AUTHOR(S): Kutney, James P.; Hewitt, Gary M.; Lee, Gin; Piotrowska, Krystyna; Roberts, Malcolm; Rettig, Steven J.
CORPORATE SOURCE: Dep. Chem., Univ. British Columbia, Vancouver, BC, V6T 1Y6, Can.
SOURCE: Canadian Journal of Chemistry (1992), 70(5), 1455-80
CODEN: CJCHAG; ISSN: 0008-4042
DOCUMENT TYPE: Journal
LANGUAGE: English

AB A detailed study of metabolites produced by the plant cell culture line of T. wilfordii, a Chinese herbal plant, is presented. Eighteen compds. within the diterpene and triterpene families were isolated and fully characterized. Of these, 5 are novel compds., and their structures were detd. by a combination of spectral anal., chem. correlation and single crystal X-ray diffraction. The interest of these compds. in the treatment of rheumatoid **arthritis**, skin allergies, and for male

contraception is noted.
IT **1740-19-8**, Dehydroabietic acid
RL: BOC (Biological occurrence); BSU (Biological study, unclassified); BIOL (Biological study); OCCU (Occurrence)
(of Tripterygium wilfordii)

L15 ANSWER 7 OF 8 HCAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1989:458099 HCAPLUS
DOCUMENT NUMBER: 111:58099
TITLE: Investigation and utilization of chemical constituents from plants. Part I. Chemical and biological studies on the roots of (A) Clausena lansium Skeels and (B) Neolitsea parvigemma Kan. & Sas. Part II. Utilization of common natural products as synthons: preparation of potential anti-**inflammatory** agents from dehydroabietic acid
AUTHOR(S): Li, Wen Shyong
CORPORATE SOURCE: Univ. Mississippi, University, MS, USA
SOURCE: (1987) 180 pp. Avail.: Univ. Microfilms Int., Order No. DA8804283
From: Diss. Abstr. Int. B 1988, 48(12), Pt. 1, 3545
DOCUMENT TYPE: Dissertation
LANGUAGE: English
AB Unavailable
IT **1740-19-8**, Dehydroabietic acid
RL: RCT (Reactant); RACT (Reactant or reagent)
(synthon for potential **antiinflammatory** agents)

L15 ANSWER 8 OF 8 HCAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1989:231929 HCAPLUS
DOCUMENT NUMBER: 110:231929
TITLE: Preparation of pyrazolyl- and thiazolylabietic acid amides as anticholesteremics
INVENTOR(S): Yoshikuni, Yoshiaki; Chokai, Shoichi; Fujita, Ikuo; Ozaki, Takayuki
PATENT ASSIGNEE(S): Nippon Shinyaku Co., Ltd., Japan
SOURCE: Ger. Offen., 6 pp.
CODEN: GWXXBX
DOCUMENT TYPE: Patent
LANGUAGE: German
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
DE 3704404	A1	19870820	DE 1987-3704404	19870212
DE 3704404	C2	19910307		
JP 62190169	A2	19870820	JP 1986-31585	19860215
JP 05074588	B4	19931018		
JP 62190177	A2	19870820	JP 1986-31586	19860215
JP 06006580	B4	19940126		
GB 2186575	A1	19870819	GB 1987-3529	19870216
GB 2186575	B2	19891108		
FR 2598413	A1	19871113	FR 1987-1924	19870216
FR 2598413	B1	19900323		
US 4755523	A	19880705	US 1987-15287	19870217

PRIORITY APPLN. INFO.: JP 1986-31585 19860215
JP 1986-31586 19860215

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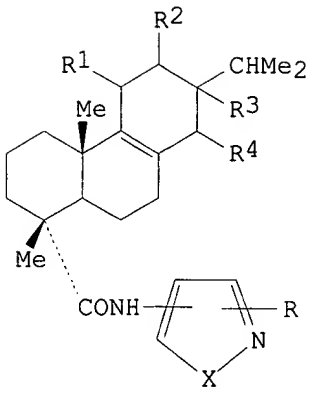

I

AB The title compds. [I; R = H, alkyl, Ph, HO2CCH2; R1-R4 = H; R1R2, R3R4 = bond; X = R5N, S; R5 = H, alkyl (un)substituted Ph] were prepd. as hypocholesterolemics, useful in the treatment of **arteriosclerosis** . .DELTA.8-Dehydroabietic acid in refluxing C6H6 was treated with SOCl2 for 2 h. The resulting acid chloride was amidated with 1-phenyl-5-aminopyrazole in dioxane contg. Et3N to give 70% 1-phenyl-5-(.DELTA.8-dehydroabietoylamino)pyrazole. I reduced serum cholesterol when administered orally to rats and mice.

IT **1740-19-8**, Dehydroabietic acid
RL: PROC (Process)
(conversion of, to acid chloride)

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=> select hit rn l15 1-8
E283 THROUGH E289 ASSIGNED

=> fil reg
FILE 'REGISTRY' ENTERED AT 17:46:09 ON 22 APR 2003
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STRUCTURE FILE UPDATES: 21 APR 2003 HIGHEST RN 503584-60-9
DICTIONARY FILE UPDATES: 21 APR 2003 HIGHEST RN 503584-60-9

TSCA INFORMATION NOW CURRENT THROUGH JANUARY 6, 2003

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Crossover limits have been increased. See HELP CROSSOVER for details.

Experimental and calculated property data are now available. See HELP PROPERTIES for more information. See STNote 27, Searching Properties in the CAS Registry File, for complete details:
http://www.cas.org/ONLINE/STN/STNOTES/stnotes27.pdf

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             1 1235-74-1/BI
               (1235-74-1/RN)
             1 144969-67-5/BI
               (144969-67-5/RN)
             1 144969-68-6/BI
               (144969-68-6/RN)
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             1 144969-76-6/BI
               (144969-76-6/RN)
             1 5155-70-4/BI
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               I OR 144969-71-1/BI OR 144969-76-6/BI OR 5155-70-4/BI)

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L16  ANSWER 1 OF 7  REGISTRY  COPYRIGHT 2003 ACS
RN   144969-76-6  REGISTRY
CN   2-Phenanthreneacetic acid, 8-carboxy-4b,5,6,7,8,8a,9,10-octahydro-
     .alpha.,4b,8-trimethyl- (9CI)  (CA INDEX NAME)
FS   3D CONCORD
MF   C20 H26 O4
SR   CA
LC   STN Files:   BEILSTEIN*, CA, CAPLUS, TOXCENTER
         (*File contains numerically searchable property data)
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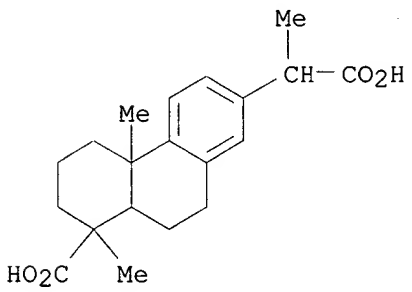


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**PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT**

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               1 REFERENCES IN FILE CAPLUS (1962 TO DATE)

REFERENCE   1:  118:39189

L16  ANSWER 2 OF 7  REGISTRY  COPYRIGHT 2003 ACS
RN   144969-71-1  REGISTRY
CN   2-Phenanthreneacetic acid, 4b,5,6,7,8,8a,9,10-octahydro-8-
     (methoxycarbonyl)-.alpha.,4b,8-trimethyl- (9CI)  (CA INDEX NAME)
FS   3D CONCORD
MF   C21 H28 O4
SR   CA
LC   STN Files:   BEILSTEIN*, CA, CAPLUS, TOXCENTER
         (*File contains numerically searchable property data)
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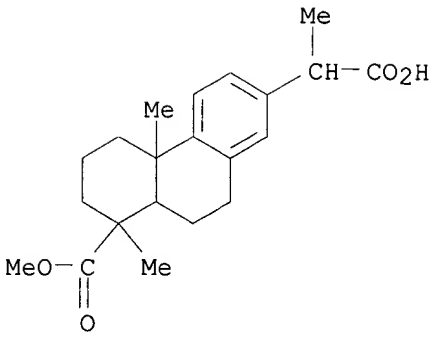
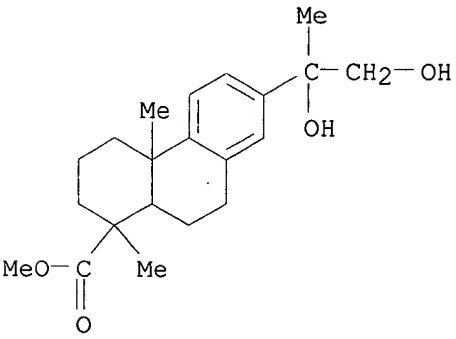


PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT

1 REFERENCES IN FILE CA (1962 TO DATE)
1 REFERENCES IN FILE CAPLUS (1962 TO DATE)

REFERENCE 1: 118:39189

L16 ANSWER 3 OF 7 REGISTRY COPYRIGHT 2003 ACS
RN **144969-68-6** REGISTRY
CN 1-Phenanthrenecarboxylic acid, 7-(1,2-dihydroxy-1-methylethyl)-1,2,3,4,4a,9,10,10a-octahydro-1,4a-dimethyl-, methyl ester (9CI) (CA INDEX NAME)
FS 3D CONCORD
MF C21 H30 O4
SR CA
LC STN Files: BEILSTEIN*, CA, CAPLUS, TOXCENTER
(*File contains numerically searchable property data)



PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT

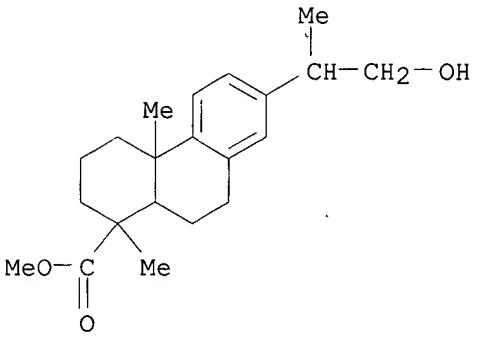
2 REFERENCES IN FILE CA (1962 TO DATE)
2 REFERENCES IN FILE CAPLUS (1962 TO DATE)

REFERENCE 1: 123:138444

REFERENCE 2: 118:39189

L16 ANSWER 4 OF 7 REGISTRY COPYRIGHT 2003 ACS
RN **144969-67-5** REGISTRY
CN 1-Phenanthrenecarboxylic acid, 1,2,3,4,4a,9,10,10a-octahydro-7-(2-hydroxy-1-methylethyl)-1,4a-dimethyl-, methyl ester (9CI) (CA INDEX NAME)

FS 3D CONCORD
MF C21 H30 O3
SR CA
LC STN Files: BEILSTEIN*, CA, CAPLUS, TOXCENTER
(*File contains numerically searchable property data)



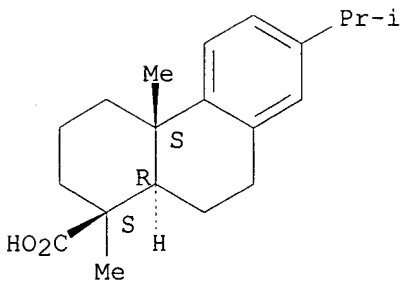
PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT

1 REFERENCES IN FILE CA (1962 TO DATE)
1 REFERENCES IN FILE CAPLUS (1962 TO DATE)

REFERENCE 1: 118:39189

L16 ANSWER 5 OF 7 REGISTRY COPYRIGHT 2003 ACS
RN **5155-70-4** REGISTRY
CN 1-Phenanthrenecarboxylic acid, 1,2,3,4,4a,9,10,10a-octahydro-1,4a-dimethyl-7-(1-methylethyl)-, (1S,4aS,10aR)- (9CI) (CA INDEX NAME)
OTHER CA INDEX NAMES:
CN 1-Phenanthrenecarboxylic acid, 1,2,3,4,4a,9,10,10a-octahydro-1,4a-dimethyl-7-(1-methylethyl)-, [1S-(1.alpha.,4a.alpha.,10a.beta.)]-
CN Podocarpa-8,11,13-trien-16-oic acid, 13-isopropyl- (7CI, 8CI)
OTHER NAMES:
CN 4-epi-Dehydroabietic acid
CN 4-Epiabietic acid, dehydro-
CN 4-Epidehydroabietic acid
CN Callitrisic acid
CN Dehydro-4-epiabietic acid
FS STEREOSEARCH
DR 18045-62-0
MF C20 H28 O2
LC STN Files: AGRICOLA, BEILSTEIN*, BIOSIS, CA, CAOLD, CAPLUS, CHEMINFORMRX, GMELIN*, NAPRALERT, SPECINFO, TOXCENTER
(*File contains numerically searchable property data)

Absolute stereochemistry.



PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT

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32 REFERENCES IN FILE CAPLUS (1962 TO DATE)
3 REFERENCES IN FILE CAOLD (PRIOR TO 1967)

REFERENCE 1: 135:361665

REFERENCE 2: 134:219686

REFERENCE 3: 134:27513

REFERENCE 4: 132:47500

REFERENCE 5: 131:198770

REFERENCE 6: 125:246547

REFERENCE 7: 123:138736

REFERENCE 8: 123:112443

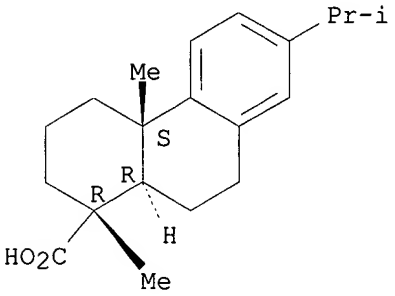
REFERENCE 9: 122:85370

REFERENCE 10: 121:303285

L16 ANSWER 6 OF 7 REGISTRY COPYRIGHT 2003 ACS
RN **1740-19-8** REGISTRY
CN 1-Phenanthrenecarboxylic acid, 1,2,3,4,4a,9,10,10a-octahydro-1,4a-dimethyl-7-(1-methylethyl)-, (1R,4aS,10aR)- (9CI) (CA INDEX NAME)
OTHER CA INDEX NAMES:
CN 1-Phenanthrenecarboxylic acid, 1,2,3,4,4a,9,10,10a-octahydro-1,4a-dimethyl-7-(1-methylethyl)-, [1R-(1.alpha.,4a.beta.,10a.alpha.)]-
CN Abietic acid, dehydro- (6CI)
CN Podocarpa-8,11,13-trien-15-oic acid, 13-isopropyl- (7CI, 8CI)
OTHER NAMES:
CN (-)-Dehydroabietic acid
CN Abieta-8,11,13-trien-18-oic acid
CN Dehydroabietic acid
FS STEREOSEARCH
DR 135577-73-0, 2501-27-1
MF C20 H28 O2
CI COM
LC STN Files: AGRICOLA, ANABSTR, AQUIRE, BEILSTEIN*, BIOBUSINESS, BIOSIS, BIOTECHNO, CA, CANCERLIT, CAOLD, CAPLUS, CASREACT, CHEMCATS, CHEMINFORMRX, CHEMLIST, CSCHEM, CSNB, DIPPR*, EMBASE, GMELIN*, IFICDB, IFIPAT, IFIUDB, IPA, MEDLINE, NAPRALERT, NIOSHTIC, PIRA, PROMT, RTECS*, SPECINFO, SYNTHLINE, TOXCENTER, ULIDAT, USPAT2, USPATFULL
(*File contains numerically searchable property data)

Other Sources: DSL**, EINECS**, TSCA**
(**Enter CHEMLIST File for up-to-date regulatory information)

Absolute stereochemistry. Rotation (+).



PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT

1182 REFERENCES IN FILE CA (1962 TO DATE)
46 REFERENCES TO NON-SPECIFIC DERIVATIVES IN FILE CA
1184 REFERENCES IN FILE CAPLUS (1962 TO DATE)
34 REFERENCES IN FILE CAOLD (PRIOR TO 1967)

REFERENCE 1: 138:256775

REFERENCE 2: 138:242607

REFERENCE 3: 138:234762

REFERENCE 4: 138:233155

REFERENCE 5: 138:223133

REFERENCE 6: 138:221722

REFERENCE 7: 138:210040

REFERENCE 8: 138:210039

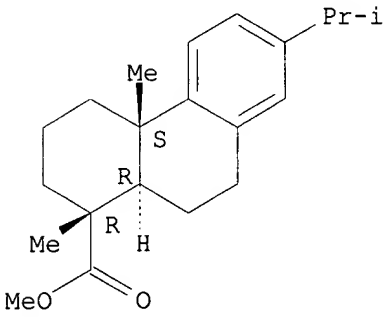
REFERENCE 9: 138:175367

REFERENCE 10: 138:172856

L16 ANSWER 7 OF 7 REGISTRY COPYRIGHT 2003 ACS
RN **1235-74-1** REGISTRY
CN 1-Phenanthrenecarboxylic acid, 1,2,3,4,4a,9,10,10a-octahydro-1,4a-dimethyl-7-(1-methylethyl)-, methyl ester, (1R,4aS,10aR)- (9CI) (CA INDEX NAME)
OTHER CA INDEX NAMES:
CN 1-Phenanthrenecarboxylic acid, 1,2,3,4,4a,9,10,10a-octahydro-1,4a-dimethyl-7-(1-methylethyl)-, methyl ester, [1R-(1.alpha.,4a.beta.,10a.alpha.)]-
CN Abietic acid, dehydro-, methyl ester (6CI)
CN Podocarpa-8,11,13-trien-15-oic acid, 13-isopropyl-, methyl ester (7CI, 8CI)
OTHER NAMES:
CN Dehydroabietic acid methyl ester
CN Methyl 8,11,13-Abietatrien-18-oate
CN Methyl dehydroabietate
FS STEREOSEARCH
DR 83159-14-2

MF C21 H30 O2
LC STN Files: AGRICOLA, ANABSTR, BEILSTEIN*, BIOBUSINESS, BIOSIS, CA, CAOLD, CAPLUS, CASREACT, CHEMLIST, IFICDB, IFIPAT, IFIUDB, IPA, NAPRALERT, SPECINFO, TOXCENTER, USPATFULL
(*File contains numerically searchable property data)

Absolute stereochemistry.



PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT

258 REFERENCES IN FILE CA (1962 TO DATE)
258 REFERENCES IN FILE CAPLUS (1962 TO DATE)
20 REFERENCES IN FILE CAOLD (PRIOR TO 1967)

REFERENCE 1: 138:256775

REFERENCE 2: 138:86346

REFERENCE 3: 137:374837

REFERENCE 4: 137:283327

REFERENCE 5: 137:80637

REFERENCE 6: 137:41021

REFERENCE 7: 136:344713

REFERENCE 8: 136:318987

REFERENCE 9: 136:296407

REFERENCE 10: 136:257244

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FILE 'HCAPLUS' ENTERED AT 17:49:20 ON 22 APR 2003
USE IS SUBJECT TO THE TERMS OF YOUR STN CUSTOMER AGREEMENT.
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FILE COVERS 1907 - 22 Apr 2003  VOL 138 ISS 17
FILE LAST UPDATED: 21 Apr 2003  (20030421/ED)

 This file contains CAS Registry Numbers for easy and accurate
 substance identification.


=> d stat que l17 nos
L7              STR
L9          214 SEA FILE=REGISTRY SSS FUL L7
L13           8 SEA FILE=HCAPLUS ABB=ON  PLU=ON  L9 AND (AUTOIMMUN? OR
                ?ARTHRIT? OR ?RHEMAT? OR ?INFLAM? OR ?SCLERO?)
L14           1 SEA FILE=HCAPLUS ABB=ON  PLU=ON  L9 AND CHEMOKIN?
L15           8 SEA FILE=HCAPLUS ABB=ON  PLU=ON  L13 OR L14
L17           4 SEA FILE=HCAPLUS ABB=ON  PLU=ON  (L9(L)(?MEDIC? OR ?PHARM? OR
                ?THERAP? OR ?DRUG?)) NOT L15


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L17  ANSWER 1 OF 4  HCAPLUS  COPYRIGHT 2003 ACS
ACCESSION NUMBER:         2000:686119  HCAPLUS
DOCUMENT NUMBER:          133:267892
TITLE:                    Sterilizable, skin-compatible medical adhesive tapes
INVENTOR(S):              Gebauer, Manfred; Huefftlein, Karlheinz
PATENT ASSIGNEE(S):       RMH Polymers G.m.b.H. und Co. K.-G., Germany
SOURCE:                   Ger. Offen., 10 pp.
                          CODEN: GWXXBX
DOCUMENT TYPE:            Patent
LANGUAGE:                 German
FAMILY ACC. NUM. COUNT:   1
PATENT INFORMATION:

     PATENT NO.        KIND  DATE          APPLICATION NO.  DATE
     ---------------   ----  --------      ---------------  --------
     DE 19913719        A1   20000928      DE 1999-19913719 19990326
PRIORITY APPLN. INFO.:                   DE 1999-19913719    19990326
AB   Adhesive tapes for medial application are based on a carrier tape which
     has applied on both sides a pressure-sensitive adhesive.  The carrier is a
     terpolymer of C4-12-alkyl (meth)acrylate 65-75, vinylcarboxylic acid
     10-20, and vinyl arom. monomer 5-15%.  The adhesive is based on 50-80% one
     acrylic polymer (A) and 20-50% another acrylic polymer (B).  Part A is
```

comprised of C4-12-alkyl acrylate 73-85, vinylcarboxylic acid 5-15, methacrylate 4-8, di- or triacrylate 0.2-0.5, and hydrogenated balsam or tall-oil resin 2-4%. Part B is comprised of C4-12-alkyl acrylate 75-85, vinylcarboxylic acid 10-20, methacrylate 2-6, and hydrogenated balsam or tall-oil resin 0.5-2%. The adhesive tapes are sol. in aq. alk. media.

IT **1740-19-8**, Dehydroabietic acid
RL: TEM (Technical or engineered material use); USES (Uses)
(in adhesives for sterilizable **medical** adhesive tapes)

L17 ANSWER 2 OF 4 HCAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1997:210572 HCAPLUS
DOCUMENT NUMBER: 126:297751
TITLE: High-performance liquid chromatographic determination of dehydroabietic and abietic acids in traditional Chinese medications
AUTHOR(S): Lee, B. L.; Koh, D.; Ong, H. Y.; Ong, C. N.
CORPORATE SOURCE: Department of Community, Occupational and Family Medicine, National University of Singapore, National University Hospital, Lower Kent Ridge Road, Singapore, Singapore
SOURCE: Journal of Chromatography, A (1997), 763(1-2), 221-226
CODEN: JCRAEY; ISSN: 0021-9673
PUBLISHER: Elsevier
DOCUMENT TYPE: Journal
LANGUAGE: English

AB In Asia, there is still a high usage of traditional Chinese medicament by the general population. Some patients with contact dermatitis to these medicaments have been found to be sensitive to colophony on patch testing. Dehydroabietic acid (DHAA) and abietic acid (AA) are the main components of colophony and believed to be the agents responsible for skin sensitization. This paper describes a reliable high-performance liq.-chromatog. method for detg. these two resin acids in ointment samples. The samples were either pretreated with di-Et ether or treated with acetonitrile directly by ultrasonication for 30 min. One vol. of this sample was added to an equal vol. of water and purified by solid-phase extn. The mobile phase used was methanol-water-phosphoric acid (87:13:0.02, vol./vol.) and the flow-rate was 1 mL/min. DHAA and AA were detected at 4.3 and 6.3 min with UV detection at wavelength 200 and 239 nm, resp. However, fluorimetric detection with an excitation wavelength of 225 nm and emission wavelength of 285 nm, provided more selective detn. of DHAA. The detection limits for DHAA and AA were 1 ng. Anal. recovery generally exceeded 90. We analyzed nine types of commonly used topical Chinese medicaments and two types of Western medical ointments in Singapore. The results showed that most of these medicaments contain colophony below 5 ppm (.mu.gg-1). Only one Chinese medicament contained >70 ppm of both allergens and one of the Western medical ointments contained 0.2 of DHAA and 2.2 of AA.

IT **1740-19-8**, Dehydroabietic acid
RL: ANT (Analyte); ANST (Analytical study)
(detn. of dehydroabietic and abietic acids in traditional Chinese **medications** by HPLC)

L17 ANSWER 3 OF 4 HCAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1989:540202 HCAPLUS
DOCUMENT NUMBER: 111:140202
TITLE: Skin preparations containing mixed esters of fatty acids and modified resin acids with polyhydric alcohols
INVENTOR(S): Uehara, Keiichi; Kawabata, Akio; Iwasa, Satoru; Inoue, Yoshikazu; Tsutsumi, Yuji; Ichikawa, Hideyuki
PATENT ASSIGNEE(S): Shiseido Co., Ltd., Japan; Harima Chemicals, Inc.
SOURCE: Jpn. Kokai Tokkyo Koho, 9 pp.
CODEN: JKXXAF

DOCUMENT TYPE: Patent
LANGUAGE: Japanese
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 63183513	A2	19880728	JP 1987-13761	19870123
JP 07098730	B4	19951025		

PRIORITY APPLN. INFO.: JP 1987-13761 19870123

AB Topical skin compns. comprise esters of disproportionated and/or hydrogenated rosin and fatty acids with polyhydric alcs. Purified hydrogenated rosin (418 g) and stearic acid (190 g) were treated with 73.89 glycerol under N at 230.degree. for 3 h and at 260.degree. for 10 h to give dihydrogenated rosin monostearoyl glyceride. The latter compds. has good affinity to the skin and after 1 mo storage at 50.degree. no organoleptic changes were obsd. A lipstick contained ceresin B 10, carnauba wax 1, candelilla wax 4, dihydrogenated rosin monostearoyl glyceride 10, liq. paraffin 15, castor oil 29.70, di-2-heptylundecanoic acid glycerin 20, mica titanium 10, red iron oxide 0.05, Red No. 202 0.1, and Yellow No. 4 0.15%.

IT **122829-89-4**
RL: BIOL (Biological study)
(cosmetic and **pharmaceutical** skin prepn. contg.)

L17 ANSWER 4 OF 4 HCAPLUS COPYRIGHT 2003 ACS
ACCESSION NUMBER: 1984:400230 HCAPLUS
DOCUMENT NUMBER: 101:230
TITLE: Chemical and pharmacological studies of Salvia tomentosa
AUTHOR(S): Ulubelen, Ayhan; Miski, Mahmut; Johansson, Candan
CORPORATE SOURCE: Eczacilik Fak., IU, Istanbul, Turk.
SOURCE: Doga Bilim Dergisi, Seri C: Tip (1984), 8(1), 109-15
CODEN: DSTIDB; ISSN: 0254-2331
DOCUMENT TYPE: Journal
LANGUAGE: Turkish

AB Extn. of S. tomentosa with petroleum ether, benzene, CCl4, and alc. followed by polyamide and silica gel chromatog., permitted the isolation of several **pharmacol**. active compds. Antiochic acid [77091-10-2] was cytotoxic to L cells in culture; 6-hydroxyluteolin-7-glucoside [54300-65-1] inhibited DNA formation in these cells. Cirsimaritin [6601-62-3] and dehydroabietic acid [**1740-19-8**] were bactericidal to may Gram-pos. and -neg. bacteria.

IT **1740-19-8**
RL: BIOL (Biological study)
(from Salvia tomentosa, **pharmacol**. of)

=>
=>

=> select hit rn l17 1-4
E290 THROUGH E291 ASSIGNED

=> fil reg
FILE 'REGISTRY' ENTERED AT 17:49:55 ON 22 APR 2003
USE IS SUBJECT TO THE TERMS OF YOUR STN CUSTOMER AGREEMENT.
PLEASE SEE "HELP USAGETERMS" FOR DETAILS.

Property values tagged with IC are from the ZIC/VINITI data file provided by InfoChem.

STRUCTURE FILE UPDATES: 21 APR 2003 HIGHEST RN 503584-60-9
DICTIONARY FILE UPDATES: 21 APR 2003 HIGHEST RN 503584-60-9

TSCA INFORMATION NOW CURRENT THROUGH JANUARY 6, 2003

Please note that search-term pricing does apply when conducting SmartSELECT searches.

Crossover limits have been increased. See HELP CROSSOVER for details.

Experimental and calculated property data are now available. See HELP PROPERTIES for more information. See STNote 27, Searching Properties in the CAS Registry File, for complete details:
http://www.cas.org/ONLINE/STN/STNOTES/stnotes27.pdf

=>
=>

=> s e290-e291
1 1740-19-8/BI
(1740-19-8/RN)
1 122829-89-4/BI
(122829-89-4/RN)
L19 2 (1740-19-8/BI OR 122829-89-4/BI)

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YOU HAVE REQUESTED DATA FROM FILE 'HCAPLUS' - CONTINUE? (Y)/N:end

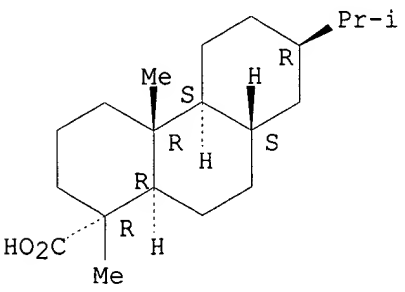
=> d ide can l19 1-2

L19 ANSWER 1 OF 2 REGISTRY COPYRIGHT 2003 ACS
RN **122829-89-4** REGISTRY
CN 1-Phenanthrenecarboxylic acid, tetradecahydro-1,4a-dimethyl-7-(1-methylethyl)-, monoester with 1,2,3-propanetriol mono[1,2,3,4,4a,9,10,10a-octahydro-1,4a-dimethyl-7-(1-methylethyl)-1-phenanthrenecarboxylate] (9CI) (CA INDEX NAME)
FS STEREOSEARCH
MF C43 H66 O5
CI IDS
SR CA
LC STN Files: CA, CAPLUS

CM 1

CRN 28241-05-6
CMF C20 H34 O2

Absolute stereochemistry.



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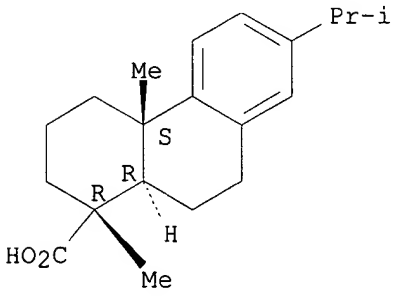
CRN 1740-19-8
CMF C20 H28 O2

Absolute stereochemistry. Rotation (+).



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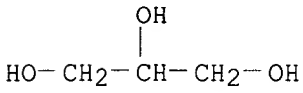
CRN 56-81-5
CMF C3 H8 O3

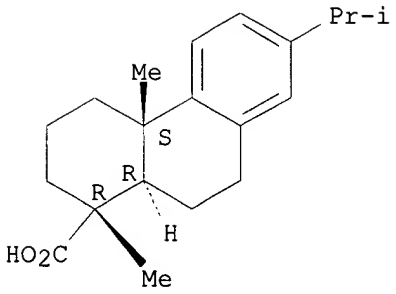


1 REFERENCES IN FILE CA (1962 TO DATE)
1 REFERENCES IN FILE CAPLUS (1962 TO DATE)

REFERENCE 1: 111:140202

L19 ANSWER 2 OF 2 REGISTRY COPYRIGHT 2003 ACS
RN **1740-19-8** REGISTRY
CN 1-Phenanthrenecarboxylic acid, 1,2,3,4,4a,9,10,10a-octahydro-1,4a-dimethyl-7-(1-methylethyl)-, (1R,4aS,10aR)- (9CI) (CA INDEX NAME)
OTHER CA INDEX NAMES:
CN 1-Phenanthrenecarboxylic acid, 1,2,3,4,4a,9,10,10a-octahydro-1,4a-dimethyl-7-(1-methylethyl)-, [1R-(1.alpha.,4a.beta.,10a.alpha.)]-
CN Abietic acid, dehydro- (6CI)
CN Podocarpa-8,11,13-trien-15-oic acid, 13-isopropyl- (7CI, 8CI)
OTHER NAMES:
CN (-)-Dehydroabietic acid
CN Abieta-8,11,13-trien-18-oic acid
CN Dehydroabietic acid
FS STEREOSEARCH
DR 135577-73-0, 2501-27-1
MF C20 H28 O2
CI COM
LC STN Files: AGRICOLA, ANABSTR, AQUIRE, BEILSTEIN*, BIOBUSINESS, BIOSIS, BIOTECHNO, CA, CANCERLIT, CAOLD, CAPLUS, CASREACT, CHEMCATS, CHEMINFORMRX, CHEMLIST, CSCHEM, CSNB, DIPPR*, EMBASE, GMELIN*, IFICDB, IFIPAT, IFIUDB, IPA, MEDLINE, NAPRALERT, NIOSHTIC, PIRA, PROMT, RTECS*, SPECINFO, SYNTHLINE, TOXCENTER, ULIDAT, USPAT2, USPATFULL
(*File contains numerically searchable property data)
Other Sources: DSL**, EINECS**, TSCA**
(**Enter CHEMLIST File for up-to-date regulatory information)

Absolute stereochemistry. Rotation (+).



PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT

1182 REFERENCES IN FILE CA (1962 TO DATE)
46 REFERENCES TO NON-SPECIFIC DERIVATIVES IN FILE CA
1184 REFERENCES IN FILE CAPLUS (1962 TO DATE)
34 REFERENCES IN FILE CAOLD (PRIOR TO 1967)

REFERENCE 1: 138:256775

REFERENCE 2: 138:242607

REFERENCE 3: 138:234762

REFERENCE 4: 138:233155

REFERENCE 5: 138:223133

REFERENCE 6: 138:221722

REFERENCE 7: 138:210040

REFERENCE 8: 138:210039

REFERENCE 9: 138:175367

REFERENCE 10: 138:172856